

DEVI AHILYA VISHWAVIDYALAYA, INDORE
SCHOOL OF PHYSICAL EDUCATION

Ordinance
Syllabus and Scheme
of
B.P.E.S.

(Bachelor of Physical Education and Sports)

DEVI AHILYA VISHWAVIDYALAYA, INDORE

Ordinance

1. **Degree Title** : Bachelor of Physical Education and Sports (B.P.E.S.)

2. **Name of the Faculty** : Faculty of Physical Education

3. **Duration** : 3 Years (Six Semesters)

4. **Eligibility:**

The candidate must have completed his/her Higher Secondary (10+2 scheme examination or Intermediate examination or the pre-university (10+2) or any other equivalent examination recognized by the M.P. Board of Secondary Education, Bhopal or any other Board recognized for this purpose by Devi Ahilya Vishwavidyalaya, Indore as equivalent. Reservation and age rules as per State Govt.

5. **Admission Procedure:**

As decided by Devi Ahilya Vishwavidyalaya from time to time.

6. **Total Seats:**

As per U.G.C./N.C.T.E./other Statutory Councils from time to time.

7. **Fee Structure:**

As decided by Devi Ahilya Vishwavidyalaya or State Govt., from time to time.

8. **Examination, Curriculum and Related Regulation:**

As per ordinance 31 of Devi Ahilya Vishwavidyalaya.

9. **Eligibility for the award of the degree:**

A candidate shall be eligible for the degree of Bachelor of Physical Education when he/she has completed the requirement of examination successfully as per ordinance No-31.

10. **Attendance:**

Attendance in theory and practical subjects shall be compulsory. A minimum of 75% attendance is required separately for each theory and practical's subjects.

11. **General Instruction:**

For matters not covered in this ordinance, general rules of Devi Ahilya Vishwavidyalaya, as applicable in semester examination shall apply in other matters. Executive council of Devi Ahilya Vishwavidyalaya shall be competent to take decision.

SCHOOL OF PHYSICAL EDUCATION

DEVI AHILYA VISHWAVIDYALAYA, INDORE

BACHELOR OF PHYSICAL EDUCATION AND SPORTS (B.P.E.S.)

General Rules and Scheme of Examination

1. The Examination for the degree of Bachelor of Physical Education and Sports will be of six semester (three years) duration:
 - (i) B.P.E.S. Semester I and Semester II
 - (ii) B.P.E.S. Semester III and Semester IV
 - (iii) B.P.E.S. Semester V and Semester VI

2. A candidate, who –
 - (a) Completed his/her Higher Secondary (10 + 2scheme) examination or Intermediate examination or the pre-university (10+2) or any other equivalent examination recognized by the M.P. Board of Secondary Education, Bhopal or any other Board recognized for this purpose by Devi Ahilya Vishwavidyalaya, Indore as equivalent thereto or
 - (b) Admission subject to : being selected on the basis of admission tests prevailing in the year when admission is sought in the department.
 - (c) After obtaining Indian or foreign qualifications recognized as equivalent to those mentioned in 2 (a) above by the Devi Ahilya University and on the basis of admission tests, shall be admitted to Semester – I for the degree of Bachelor of Physical Education.

3. The provisions of ordinance 31 will be applicable for this course.

Examination

1. For UTD the examination will be conducted according to ordinance 31. and for affiliated colleges according to ordinance 5.
2. The medium of instruction shall be Hindi / English and a candidate can take examination either in Hindi or English.

ACADEMIC PROGRAMME
(With No. of Lectures and Credits Per Week)

B.P.E.S. Ist Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
		Lectures	Tutorials	Practicals /Project Work		
T-01	Basic and Systemic Anatomy - I	03	-	-	03	
T-02	Principles of Physical Education	03	-	-	03	
T-03	English - I	03	-	-	03	
Part – B (Practicals)						
P-01	Athletics	03	-	-	03	
P-02	Gymnastics	03	-	-	03	
P-03	Yoga	03	-	-	03	
P-04	Conditioning & Match Practice	05	-	05	08	
Part – C (Viva-voce)						
C-01	Comprehensive Viva-voce				04	

Total Credits - 30

B.P.E.S. IInd Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
		Lectures	Tutorials	Practicals/ Project Work		
T-04	Basic and Systemic Anatomy - II	03			03	
T-05	History of Physical Education	03			03	
T-06	English - II	03			03	
Part – B (Practicals)						
P-05	Athletics - II	03			03	
P-06	Gymnastics - II	03			03	
P-07	Yoga - II	03			03	
P-08	Conditioning & Match Practice	05		05	08	
Part –C (Viva-voce)						
C-02	Comprehensive Viva-voce				04	

Total Credits – 30

B.P.E.S. IIIrd Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
		Lectures	Tutorials	Practicals /Project Work		
T-7	Physiology and Physiology of Exercise	03			03	
T-8	Educational Psychology	03			03	
T-9	Methods in Physical Education	03			03	
Part – B (Practicals)						
P-09	Volleyball	03			03	
P-10	Weight Lifting and Training	03			03	
P-11	Teaching Practice	03			03	
P-12	Conditioning & Match Practice	05		05	08	
Part – C (Viva-voce)						
C-03	Comprehensive Viva-voce				04	

Total Credits - 30

B.P.E.S. IVth Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
		Lectures	Tutorials	Practicals /Project Work		
T-10	Kinesiology	03			03	
T-11	Basics of Sports Training	03			03	
T-12	Health Education	03			03	
Part – B (Practicals)						
P-13	Badminton/ Hockey	03			03	
P-14	Football/ Cricket	03			03	
P-15	Teaching Practice	03			03	
P-16	Conditioning & Match Practice	05		05	08	
Part –C (Viva-voce)						
C-04	Comprehensive Viva-voce	-	-	-	04	

Total Credits- 30

B.P.E.S. Vth Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
Paper Code	Nomenclature	Lectures	Tutorials	Practicals /Project Work		
T-13	Management of Physical Education	03			03	
T-14	Gym Management and Fitness Training	03			03	
T-15	Sports Specialization	03			03	
Part – B (Practicals)						
P-17	Table Tennis	03			03	
P-18	Kabbadi	03			03	
P-19	Sports Specialization (Practical Skill)	03			03	
P-20	Conditioning & Match Practice	05		05	08	
Part –C (Viva-Voce)						
C-05	Comprehensive Viva-voce				04	

Total Credits - 30

B.P.E.S. VIth Semester

Part –A (Theory Papers)		No. of Classes per week			No. of Credits	Faculty Name
Paper Code	Nomenclature	Lectures				
T-16	Test and Measurement in Physical Education	03			03	
T-17	Correctives and Rehabilitation in Physical Education	03			03	
T-18	Sports Specialization	03			03	
Part – B (Practicals)						
P-21	Kho-Kho	03			03	
P-22	Tennis	03			03	
P-23	Sp. Specialization (Coaching Lesson)	03			03	
P-24	Conditioning & Match Practice	05		05	08	
Part –C (Viva-voce)						
C-06	Comprehensive Viva-voce				04	

Total Credits - 30

SCHEME OF EXAMINATION
(As per Ordinance 31)

B.P.E.S. SEMESTER – I

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-1	Basic and Systemic Anatomy - I	60	40
T-2	Principles of Physical Education	60	40
T-3	English - I	60	40
Part – B (Practicals)			
P-1	Athletics - I	60	40
P-2	Gymnastics - I	60	40
P-3	Yoga - I	60	40
P-4	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part –C (Viva-voce)			
C-01	Comprehensive Viva-voce	100	
	TOTAL	460	340

Grand Total

800

B.P.E.S. SEMESTER – II

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-4	Basic and Systemic Anatomy - II	60	40
T-5	History of Physical Education	60	40
T-6	English - II	60	40
Part – B (Practicals)			
P-5	Athletics - II	60	40
P-6	Gymnastics - II	60	40
P-7	Yoga - II	60	40
P-8	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part –C (Viva-voce)			
C-02	Comprehensive Viva-voce	100	
	TOTAL	460	340

Grand Total

800

B.P.E.S. SEMESTER – III

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-7	Physiology and Physiology of Exercise	60	40
T-8	Educational Psychology	60	40
T-9	Methods in Physical Education	60	40
Part – B (Practicals)			
P-09	Volleyball	60	40
P-10	Weight Lifting and Training	60	40
P-11	Teaching Practice	60	40
P-12	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part – C (Viva-voce)			
C-03	Comprehensive Viva-voce	100	
	TOTAL	460	340

Grand Total

800

B.P.E.S. SEMESTER – IV

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-10	Kinesiology	60	40
T-11	Basics of Sports Training	60	40
T-12	Health Education	60	40
Part – B (Practicals)			
P-13	Badminton/ Hockey	60	40
P-14	Football/ Cricket	60	40
P-15	Teaching Practice	60	40
P-16	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part – C (Viva-voce)			
C-04	Comprehensive Viva-voce	100	
	TOTAL	460	340

Grand Total

800

B.P.E.S. SEMESTER – V

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-13	Management of Physical Education	60	40
T-14	Gym Management and Fitness Training	60	40
T-15	Sports Specialization	60	40
Part – B (Practicals & Sports Specialization)			
P-17	Table Tennis	60	40
P-18	Kabbadi	60	40
P-19	Sports Specialization (Practical Skill)	60	40
P-20	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part –C (Viva-voce)			
C-05	Comprehensive Viva-voce	100	
	TOTAL	460	340

Grand Total

800

B.P.E.S. SEMESTER – VI

Part – A (Theory Papers)		Maximum Marks	
		External	Internal
T-16	Test and Measurement in Physical Education	60	40
T-17	Correctives and Rehabilitation in Physical Education	60	40
T-18	Sports Specialization	60	40
Part – B (Practicals & Sports Specialization)			
P-21	Kho-Kho	60	40
P-22	Basketball	60	40
P-23	Sp. Specialization (Coaching Lesson)	60	40
P-24	Conditioning & Match Practice Conditioning - 60 marks Match Practice - 40 marks	-	100
Part –C (Viva-voce)			
C-06	Comprehensive Viva-voce	100	
	SUB TOTAL	460	340

Grand Total

800

Semesters	Maximum Marks
Semester – I	800
Semester – II	800
Semester – III	800
Semester – IV	800
Semester – V	800
Semester – VI	800
GRAND TOTAL	4800

BPES SEMESTER - I

BASIC AND SYSTEMIC ANATOMY- I

Unit - I Introduction

- (i) Meaning and Concept of Anatomy
 - a. Definition of Anatomy
 - b. Types of Anatomy
- (ii) Need and Importance of anatomy for the students of Physical Education.
- (iii) Minute structure and functions of cells.
 - a. Structure of cell
 - b. Properties of cell
 - c. Constituents of cell and their functions
- (iv) Minute structure and functions of tissues
 - a. definition of tissue
 - b. Classification of tissues
 - c. Structure and functions of various types of tissues

Unit - II Skeletal System

- (i) **Brief introduction about the skeletal system**
 - a. composition of bone
 - b. Microscopic structure of bone
 - c. Classification of bones
 - d. Functions of bones
 - e. General features of major bones of human body
 - f. Brief introduction about skull bone
- (ii) **Joints**
 - a. Definition of joints
 - b. Classification of Joints
 - c. Anatomical structure of synovial joints
 - d. Characteristics of synovial joints
 - e. Terminology of movements around a joint

Unit - III Muscles

- a. Structural classification of muscles
- b. Functional classification of muscles
- c. Microscopic structure of muscles (skeletal, cardiac and smooth)
- d. Functions of muscles (skeletal, cardiac and smooth)
- e. Properties of skeletal muscles (elasticity, contractibility, stretchibility, irritability and muscle tone)
- f. Location (origin and insertion) and action of important muscles of human body (shoulder girdle, shoulder joint, elbow joint, hip joint, knee joint, ankle joint)

Unit - IV Cardio – vascular system

- a. Introduction about heart and cardiovascular system
- b. Structure of heart
- c. Structure of artery, veins and capillaries
- d. Blood flow through the heart
- e. Types of blood circulation
- f. Pumping action of heart and its regulation
- g. Introduction about mechanism of the contraction of heart
- h. Introduction about regulation of heart beat

Unit - V Respiratory system

- a. Introduction about respiratory system
- b. Organs of respiratory system
- c. Structure of organs
- d. Types of respiration
- e. Muscles of respiration
- f. Mechanism of respiration

Books Recommended :

- a. MC Clerg, Anderon T., Human Kinetics and Analyzing Body Movements, London : William Hein Mann Medical Book Ltd.
- b. Davis, D.V. Gray's Anatomy : London : Longmans Green and Co. Ltd.
- c. Pcatce, Evelyn B., Anatomy and Physiology for Nurse : London faber and faber Ltd.
- d. Pearce, J.W. Anatomy for students and teachers of Physical Education, London : Edward Arnold and Co.
- e. Anderson, T. Mc. Clerg. Human Kinetics and Analyzing Body Movements, London : Wiliiam Heinman Medical Books Led. 1961.

BPES SEMESTER – I

PRINCIPLES OF PHYSICAL EDUCATION

Unit – I

- a. Meaning and Definition of Physical Education.
- b. Aims and objective of Physical Education.
- c. Scope of Physical Education.
- d. Need and Importance of Physical Education.
- e. Physical Education as an Art as Science

Unit - II

- a. Meaning of Sports Psychology
- b. Development of sports Psychology
- c. Psychological factors effecting physical Performance.
- d. Notion about mind and body Psychological unity of man

Unit - III

- a. Meaning of Camp
- b. Aims and objective of the Camps
- c. Uses of Camping /outdoor education.
- d. Types of Camp and Agencies promoting Camping.
- e. Organization of Camps and factors effecting its organization.
- f. Meaning and Definition of Recreation.
- g. Aims and objectives. of Recreation.
- h. Types of Recreation & need and Importance of recreation in modern society

Unit - IV

- a. Definition of physical fitness.
- b. Component of Physical fitness.
- c. Benefit of Physical fitness.
- d. Effect of Exercises on muscular ,circulatory ,digestive ,Respiratory system.
- e. Warming up and cooling down and their Importance.
- f. Biological Basis of life and biological weakness.
- g. Chronological ,Anatomical ,Physiological and Mental ages of individual – their implications in developing and implementing programme of physical education.

Unit - V

- a. Games and sports as mans cultural heritage
- b. Sports and socialization
- c. Physical Education and sports as a need of the society
- d. Social Institution and their influence on the society.

References:

- 1) Bucher, Charles,A. Foundation of physical Education St. Louis: The C.V.Mosby Co. 1986 dollar 9.50.
- 2) Nixon Engene D. and Couson W. An introduction to physical Education , Philadelphia,London: W.B.Saunders Co. 1969,
- 3) Oderteuter ,Delbert : Physical Education , New York ,Harper and Brothers publishers 1970.
- 4) Sharma ,Jakson ,R. Introduction to physical education , New York: A.S Barnes and Co. 1964.
- 5) Willaims Jeses Feiring : The Principle of Education , Philadelphia : W.B.Saunders Co. 1964

B PES SEMESTER – I

ENGLISH- I

Unit - I

- a Tenses : Present, Past and Future Tenses.
- b Vocubulary : Synonyms, Antonyms, One word, Substitution, Punctuation.
- c Preposition.
- d Co-ordinate Conjunction and Subordinate Conjunction
- e Gender & their uses.

Unit - II

- a Article : A, An, and The
- b Syntax & their uses & applications.
- c Active & Passive Voice
- d Idioms & Proverbs : Meaning and uses.

Unit - III

- a Sentences Structure – Simple and Complex Sentences.
- b Transformation (with and without changing the sense)
- c Interrogative Sentences
- d Imperative Sentences
- e Exculematory Sentences

Unit - IV Paragraph and Essay Writing

- a Writing paragraphs and essays on topics concerning sports and general awareness.

Unit - V Comprehension

- a Precise writing
- b Answering questions after reading passages.
- c Comments on reading material.

References:

1. 'High School English Grammar and Composition by P.C. Wren and M.Martin, Published by S.Chand and Com. Ltd. Ram Nagar, New Delhi 110055.
2. An intensive Course in English – Aremedial work book C.d. Sidhu. Published by Parya Adarkar, Orient Longman Ltd. Kamani Marg, Ballard Estate Bombay 400048.
3. Living English Literature Practice Book for Foreign students W. Standard Alton, Orient Longman Ltd. 1/24, Asaf Ali Road, New Delhi 110002.

BPES SEMESTER – I

GAMES (PRACTAL)

ATHLETICS, GYMNASTICS AND YOGA

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields

BPES SEMESTER – II

BASIC AND SYSTEMIC ANATOMY

Unit I : Digestive System

(i) Introduction about digestive system

- Organs of digestive system
- Structure of various parts of digestive system
- Brief introduction about the accessory organs of digestive system (liver, pancreas, gall bladder)

(ii) Secretion and function of the digestive juices

- The name of digestive juices
- Their site of secretion, nature and function

(iii) Function of Liver

- Functions of liver as an accessory organ of digestion
- Brief knowledge of general function of liver

Unit II : Nervous System

(i) Introduction about the nervous system

- Introduction about the nervous system
- Classification and organs of nervous system
- Introduction about various parts of brain
- Structure of various parts of brain
- Structure of spinal cord

(ii) Functions of the important parts of the nervous system

- Functions of cerebrum
(Basal ganglia, Thalamus & Hypothalamus)
- Functions of cerebellum
- Functions of mid brain
- Functions of pons
- Functions of medulla oblongata
- Functions of spinal cord
-

Unit III : Urino – Genital and Excretory System

(i) Brief account of urino-genital system

- Introduction about urinal system
- Structure of kidney
- Structure of ureter, bladder, urethra
- Introduction about genital system

(ii) Introduction about excretory system

- Brief concept of excretion of water from the body through skin (sweating), lungs, kidney and urinal track
- Structure of kidney and urinal track
- Formation of urine in kidney
(Simple filtration, selective reabsorbs ion and secretion)

Unit IV : Endocrine System

- Introduction about endocrine system
- Name of endocrine glands and their sites
- Structure of glands (Pituitary, Thyroid, Pancrease and Adrenal)
- Secretion of glands (Pituitary, Thyroid, Pancrease and Adrenal)
- Role of their secretion in growth, development and body functions
- Basic knowledge of transmission of hereditary characteristics

Unit V : Sensory System

- Structure of organs of vision
- Functions of various parts of eye
- Structure of organs of hearing
- Functions of various parts of ear
- Brief introduction of sense of touch (skin), smell and taste

Books Recommended:

1. MC Clerg, Anderon T., Human Kinetics and Analyyzing Body Movements, London: William Hein Mann Medical Book Ltd.
2. Davis, D.V. Gray's Anatomy: London: Longmans Green and Co. Ltd.
3. Pcarce, Evelyn B., Anatomy and Physiology for Nurse: London faber and faber Ltd.
4. Pearce, J.W. Anatomy for students and teachers of Physical Education, London: Edward Arnold and Co.
5. Anderson, T. Mc. Clerg. Human Kinetics and Analyzing Body Movements, London: William Heinman Medical Books Led. 1961.

B PES SEMESTER – II

HISTORY OF PHYSICAL EDUCATION

Unit I

- Definition of Physical Education – Its meaning and importance , misconception above Physical Education
- Aims and objectives of Physical Education .

Unit II

- Physical Education in ancient India – Vedic period – Epic Period and Buddhist period.
- Physical Education in the city states of Greece.

Unit III

- Survey of Modern Physical Education in India – pre and post independence period .
 - a. Physical Education and sports training institutions in India.
 - b. Indian Olympic Association.
 - c. Sports authority of India
- Youth welfare programmes NCC, NSS, NSC, Scouts and guides .

Unit IV

Modern Olympic games: Start of Olympics, Objectives of Olympic, Olympics Motto and Flag. Olympic charter opening and closing ceremonies, Olympic commissions and their functions.

Unit V

Contribution to the growth of Physical Education by leaders and movement in the following countries:-

- (i) Germany Johan Basedow, Guts Muths Fredrick Ludwing John , Sweden (Per Henric ling)
- (ii) Denmark (frak Nachtegal)
- (iii) Great Britain Y.M.C.A. and it contribution,
- (iv) India : Pl. Jawaharlal Nehru , Dr. P.M. Joseph Dr. J.P. Thomas , Shri H.C. Buck.

References:

1. Leonard, Fred Engene and Afflect George B. Guide to the History of Physical Education, Philadelphia : Leo and Febiger, 1962.
2. Moyumd, D.C. Encyclopedia of Indian Physical Culture, Garoda : Goods Oscupaues, 1952.
3. Rice Emmett, A. Hutchinson, John, L. and Loc Marbal A Brief History of Physical Education, New York, the Ronals Press Company, 1960.
4. Rajgopalan K. A Brief History of Physical Education in India, Delhi Army Publishers – 1962.
5. Wakharkar, D.G. Manual of Physical Education, Bombay Port Publishers Pvt. Ltd.

BPES SEMESTER – II

ENGLISH - II

Unit - I Correspondence and report writing :

- a. Personal Letters
- b. Business Letters
- c. Application
- d. Circular Letter
- e. Invitations refusal and acceptance, formal, informal and vote of thanks, welcome speech

Unit - II

- a. Reports writing (on functions and sports events).
- b. Drafting notice and minutes of meeting.

Unit - III Linguistic Contents :

- a. Direct and indirect speech.
- b. Verbal structure, approritive structures.
- c. Optative sentences.
- d. Sentences structure – Simple, compound and complex sentences.

Unit – IV

- a. Expansion of ideas (about 200 words).
- b. Adjectives, adverbs & their uses
- c. Modals
- d. Punctuation
- e. Participles
- f. Determinants

Unit – V

- a. Paragraph and Essay writing -
Writing paragraphs and essays on topics concerning sports and general awareness.
- b. Comprehension -
 1. Precise Writing
 2. Answering questions after leading passages.
 3. Comments on reading material.

References:

1. 'High School English Grammar and Composition by P.C. Wren and M.Martin, Published by S.Chand and Com. Ltd. Ram Nagar, New Delhi 110055.
2. An intensive Course in English – Aremedial work book C.d. Sidhu. Published by Pyla Adarkar, Orient Longman Ltd. Kamani Marg, Ballard Estate Bombay 400048.
3. Living English Literature Practice Book for Foreign students W. Standard Alton, Orient Longman Ltd. 1/24, Asaf Ali Road, New Delhi 110002.

BPES SEMESTER – II

GAMES (PRACTAL)

ATHLETICS, GYMNASTICS AND YOGA

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields

BPES SEMESTER – III

PHYSIOLOGY AND PHYSIOLOGY OF EXERCISE

Unit I Introduction

- (a) Meaning and concept of physiology.
- (b) Need and importance of physiology for the students of physical education.
- (c) Meaning and concept of exercise physiology.
- (d) Need and importance of exercise physiology in physical education and sports.

Unit II Cardio Pulmonary System

1. The Cardio-vascular system and Blood.
 - (a) Cardiac – cycle.
 - Definition of cardiac cycle
 - Concept of cardiac cycle with the help of diagram.
 - (b) Blood pressure, its maintenance and regulation
 - Definition of blood pressure.
 - Types of blood pressure.
 - Measurement of blood pressure.
 - Regulation of blood pressure.
 - (c) The cardiac output and its regulation
 - Concept of cardiac output.
2. The respiratory System
 1. Mechanism of Respiration.
 2. Pulmonary ventilation and its regulation.
 3. Second – wind, Oxygen debt.

Unit III Digestive, nervous and sensory system

- (a) Digestive System
 1. Absorption of Food
 2. General metabolism, metabolism of carbohydrates fats and proteins.
 3. Temperature – Regulation
- (b) Nervous System
 1. Functions of the important parts of the nervous system, cerebrum, medulla oblongata, thalamus, cerebellum and spinal cord.
 2. Functions of autonomic nervous system.
- (c) Sensory System
 1. General sensations (cutaneous and kinesthetic)
 2. Brief knowledge about various forms of senses with special reference to vision and hearing.

Unit IV Excretory, Endocrine and Reproductive Systems

- (a) The excretory System -
Excretion of water from the body through skin (sweating), lungs, kidney and GI Tract.
- (b) The Endocrine System -
 1. Secretion of endocrine glands (Pituitary, Thyroid, Adrenal and Pancreas)
 2. Role of their secretion in growth. Development and body functions.
- (c) Reproductive System -
 1. Physiology of human reproduction.
 2. Basic knowledge of transmission of hereditary characteristics.

Unit V Physiology of Exercise

1. Effect of exercise on respiratory, circulatory and muscular system.
2. Changes during muscular contraction.
3. Nerve control of muscular activity.
4. Warming-up, conditioning and training.
5. Stitch and cramps.

References:

1. Anthony, C. Parher and Kolthoff N. Jane, Text Book of Anatomy and Physiology, St. Louis : The C.V.: Mosby Company.
2. Chatterjee, C.C. Human Physiology, Calcutta, Medical Allied Agency.
3. Clarke, David, H. Exercise Physiology, New Jersey : Prentice Hall Inc., Englewood Cliffs.
4. Translated by Myshne, David, A. Text Book for Nurses Training Schools, Moscow, NIR Publishers.
5. Pearce, Evelyn, C. Anatomy and Physiology for Nurses. Calcutta, Oxford University Press.

BPES SEMESTER – III

EDUCATIONAL PSYCHOLOGY

Unit I :

- Meaning and Nature of Psychology
- Sources of psychology
- Definition of Psychology
- Psychology is a Sciences
- Branches of Psychology
- Importance of Psychology in Education with special reference to Physical Education.

Unit II:

- Growth and Development
- Meaning of growth and Maturation
- Development by maturation
- Development by exercise and learning
- Behavioral development with special reference to perceptual ,Language intellectual social, emotional and physical
- Individual differences: meaning of the terms individual differences.
- Heredity and environment as cause of individual differences
- Interaction of heredity and environment.

Unit III :

- Learning Meaning and nature of learning
- Principles of learning
- Types of learning
- Theories of learning (Trial and error ,conditioned reflex ,insight theory, learning by imitation).
- Meaning of transfer of training. Conditions of transfer of training. learning curve.
- How to overcome plateau

Unit IV:

- **Motivation**
Meaning of motivation. concept of need, drive, motive, incentive and achievement
Types of Motivation
Role of motivation on teaching physical activities
- **Emotion**
Meaning and nature of emotion.
Types of emotion.
Emotional experiences (anxiety and fear) and their effect on learning of physical activities.

Unit V;

- **Personality**
Meaning and nature of personality.
Physiological and social factors in personality.
Development of personality

- **Memory**
Definition of memory, Types of Memory.
Mechanism of the process of remembering ,memory training.
Meaning of forgetting ,Reasons of forgetting, curves of forgetting,
Importance of memory in learning physical activities.

- **Practical**
Practical will be conducted to acquaint with practical aspects of the subject.
There will be practical internal examination for 10 marks .The marks of this examination will be added to the theory sectionals.

References :

- Boaz, G.D General psychology , Madras: Boaz institute of Psychological Service,1957
- Skinner, C. E. Educational Psychology ,New Delhi : Prentice Hall of India Pvt. Ltd.
- Lindren, H. E. Educational Psychology in classroom ,New York :John Wiley & Sons Inc. 1963.
- Kamlesh ,M.L. Psychology of Physical Education and Sports , New Delhi Metropolitan Bros.
- Snum, Richar M. Psychology in Sports ,Surjeet Publication ,1982
- Silva ,J.M. and Weinberg R.S Psychology of foundations of Sports , Illinois , Human Kinetics Publishers Inc.

BPES SEMESTER – III

METHODS IN PHYSICAL EDUCATION

Unit I

(A) Meaning

Meaning of the term "teaching method" its scope and importance
The factors to be considered in determining the method of teaching.

(B) Types of method

Part-whole method, whole part method, command method, discussion method, project method, demonstration method.

(C) Principles of teaching

Unit II

Presentation Techniques

- (a) Personal preparation.
- (b) Technical preparation.
- (c) Steps of presentation.
- (d) Command and their techniques.
- (e) Situation which require different words of command.
- (f) Types of class management.

Lesson planning

Types of lessons and their values

- (a) Objectives of different lesson plans and part of the lesson introductory and development.
- (b) Skill practice/group work.
- (c) Class activity/recreation part (reassembly revision and dismissal).

Unit III

Organization and conduct of competitions

- (a) Tracks and field
- (b) Gymnastics.
- (c) Weight lifting, body building and best physique contest.
- (d) Wrestling and combatives.
- (e) Swimming, diving -aquatics.
- (f) Games and sports tournaments.

Tournaments - organization, meaning and their types

- (a) Knock -out types of elimination double elimination tournaments..
- (b) League-(single-double)or round robin type.
- (c) Combination type of tournament.
- (d) Challenge of perennial type (ladder-pyramaid type).
- (e) Miscellaneous type of small area games.

Unit IV

Audio-visual aids and teaching gadgets

- (a) Values and uses of audio visual aids.
- (b) Criteria for selecting the aids.
- (c) Steps to be followed in using teaching aids.

Publicity - meaning and method of preparation:

- (a) Demonstration.
- (b) Play days.
- (c) Exhibitions.
- (d) Sports for all days.

Unit V

Marking of track and play fields:

- (a) Track and field - track 400 m standard and 200m.
- (b) Play field - football, volleyball, basketball, hockey, badminton, kabaddi, kho-kho, softball as per international regulation.

Improvisation - ways and means of improvisation:

- (a) Area
- (b) Apparatus
- (c) Equipment
- (d) Leadership
- (3) Evolution
 - (a) Need
 - (b) Importance
 - (c) Basic methods of evaluation:
 - Observation
 - Interview
 - Tests and measurements
 - Corporative evaluation by pupil and teacher

References:

- Tirunaryanan, c. and hariharan, s. methods in physical education, karai kudi south india press, 1962.
- Kozman, b. cassidy, rosalind and jakson, c.d., methods in physical education, london: w.b. saunders company, 1960.
- Knapp, clyde and hagman, e.p. teaching methods for physical education, new york: mc graw hill book co., 1948.

B PES SEMESTER – III

GAMES (PRACTAL)

VOLLEYBALL AND WEIGHT LIFTING & TRAINING

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields

BPES SEMESTER – IV

KINESIOLOGY

Unit I: Introduction

- (A) Definition, Brief history and important contributions of Aristotle, Leonardo da Vinci, Alfonso Borelli, Weger Brothers, Benjamin Duchene.
- (B) Aims and objective of Kinesiology.
- (C) Role of Kinesiology in Physical Education and Physical Medicine.
- (D) Fundamental concepts:
Definition and brief explanation of the following terms and their application to the human body.
Axes and Planes, Centre of Gravity, Line of Gravity Base, Starting Positions.

Unit II: Anatomical Concepts

- (A) Review of classification of joints and muscles, Terminology of fundamental movements.
- (A) Types of Muscle-Contraction (Isometric and Isotonic – concentric, Eccentric), All or None Law, Reciprocal innervations and inhibition group action of muscles and Muscular Co-ordination.
- (B) Major characteristics location and action of major joints of shoulder, hip, knee, elbow, forearm and wrist joints. Location and actions of major muscles at these joints.

Unit III: Mechanical Concepts

- (A) Concept of mechanical basic of Kinesiology and its application it physical education and Sports.
- (B) Definition and brief explanation of following basic terms :
Mass, weight, force, motion, equilibrium, friction, speed, velocity, and momentum.

Unit IV:

- (A) **Kinesiological fundamental of Mechanisms**
 - (1) Simple Mechanics found in the Muscular skeletal system (Leverage and its application to human body)
 - (2) Laws of motion and their application to sports activities.
 - (3) Forces :
 - a. Moving one's own body.
 - b. Giving impetus to external objectives,
 - c. Receiving impetus.
 - (4) Equilibrium: Role of equilibrium in sports and games.

Unit V: Application

- (A) Application of basic mechanical principles to walking, running and jumping.
- (B) Motor skills of daily living.
- (C) Application of mechanics prevention of injury.

Reference:

- Brower, Marion, R. Efficiency of Human Movement. Philadelphia : W. B. Saunders Co. 1966-Dollar.
- Cooper, John, M. and R.B. Glassgow . Kinesiology . St Louis : C.V. Mosby Company , 1963.
- Scott M. Gladys. Analysis of Human Motion, New York .
- Wells, Katherine P. Kinesiology , Philadelphia. W.B. Saunders Co., 1966.
- James, G. Hay, J. Gavin Reid. The Anatomical and mechanical Bases of Human Motion. Prentice Hall Inc. New Jersey.
- Rasch Philip J. and P.K. Burke. Kinesiology and Applied Anatomy. Philadelphia. : LEA and Febiger, 1967.
- Duan, John W. Scientific Principles of Coaching . Englewood cliffs, N.J. Prentice Hall Inc. 1966.
- Duvall Elien Neal. Kinesiology . Englewood Cliffs , N.J. Prentice Hall Inc. 1956.

BPES SEMESTER – IV

BASICS OF SPORTS TRAINING

Unit - I Sports Training

- a. Definition of terms - Conditioning, Teaching, Coaching and Sports Training.
- b. Importance of sports training
- c. Aim, Tasks and Characteristics of Sports Training.
- d. Principles of Sports Training.

Unit - II Biomotor abilities and training means -

- a. Concept of biomotor abilities & definition of important motor abilities – cardio – respiratory endurance, muscular endurance, strength, speed, power, agility, flexibility, co-ordination, balance.
- b. Training means and methods for developing various fitness components.

Unit - III Warming up and cooling down

- a. Introduction
- b. Types of warming up
- c. Significance of warming up
- d. General guidelines that govern the warming up programme
- e. Methods of warming up
- f. Duration of warming up
- g. Components of warming up
- h. Physiological basis of warming up
- i. Cooling down

Unit - IV Environmental factors and sports performance

- a. Introduction
- b. Variation in temperature
- c. Humidity
- d. Altitude
- e. Physical programme at altitude
- f. Physiological function at altitude

Unit - V (A) Preiodisation

- a. Concept of periodisation and its importance.
- b. Different periods of training and their duration.
- c. Types of periodization.
- d. Aim and content of different training periods.

(B) Cycles of Training

- a. Macro Cycle
- b. Meso Cycle
- c. Micro Cycle

References:

1. Essentials of Physical Education, Dr. Ajmer Singh, Dr. Jagtar Singh Gill, Dr. Jagdish Bains, Dr. Rachpal Singh Brar, Kalyani Publishers, Ludhiana, New Delhi, Noida (UP)
2. Science of Sports Training, Dr. A.K. Uppal, Friends Publications, New Delhi (India)

3. Science of Sports Training, Hardayal Singh
4. Bratty, s perceptual and motor development in infants and children. Prentice hall,1979
5. Harre, d. principles of training.

BPES SEMESTER – IV

HEALTH EDUCATION

Unit I

(A) Health

- a. Dimensions of Health
- b. Positive Health
- c. Concept Of Health
- d. Ecology of Health
- e. Spectrum of Health
- f. Determinants of Health.

(B) Health Education

- a.. Concept ,objective and scope
- b. Principles of Health Education.
- c. Communication in Health Education.
- d. Public Health Education in attainment of Health Goals.

Unit II

(A) Health Problems

- a. Communicable diseases
- b. Nutrition
- c. Environmental sanitation
- d. Medical Care
- e. Population

(B) Organization and Administrative set-up of Health System in India

- a. Central level
- b. State Level
- c. District Level.

(C) Planning of Health Education programme

- a. Practice of Health Education Programme.
- b. Steps to be followed in Planning and Health Education Programme.

(D) Brief Description of Maternal Child Health

Unit III

(A) Hygiene

The Concept, Care of Skin, Mouth, nails, clothing, bathing etc.
Importance of rest, sleep and exercise.

(B) Community Health

Brief account of Housing water supply ,sewage and refuse disposal .

(C) School Health Service

- a. History and Health Problems
- b. Objectives of School Health Service

(D) Aspects of School Health Service

- a. Health Appraisal
- b. Remedial measures and follow –up
- c. Prevention of communicable diseases
- d. Healthful school environment
- e. Nutritional services
- f. First –aid and Emergency care
- g. Mental health
- h. Dental health
- i. Eye health service.
- j. Health Education
- k. Education of handicapped children.
- l. School Health record.

Unit IV

(A) Food and Nutrition

Classification of foods ,Proximate Principles, and Role of various nutrient.

(B) Balanced diet

Definition ,Principles of preparing and balance diet. Balanced diet for Indian Players /School children .Malnutrition and Adulteration of food.

Unit V

(A) National Family Welfare Programme

Concept, need, importance, and role of Health Education in family welfare programme.

(B) Sex Education

Concept, need and organization of sex education at school level.

(C) National Health Programmers in Indian

- (a) NMEP (National Malaria Eradication Programme.)
- (b) DDCP (Diarrhoeal Diseases Control Programme.)
- (c) NFCP (National Filaria Control Programme.)
- (d) National TB Control Programme.
- (e) STD Control Programme.

(D) International Health Agencies

- (a) WHO
- (b) UNICEF
- (c) UNDP
- (d) FAO
- (e) ILO

(E) Evaluation

- (a.) Evaluation of Health Education Programme.
- (b.) Importance of Evaluation of Health Education Programme.

Reference:

1. Anderson ,C.L. and Chewell , William H. School Health Practice, St. Louis: The C. V. Mosby Company ,1986.
2. Bedi, Yashpal Social and Preventive Medicine ,New Delhi ,Atmaram and Sons ,1985.
3. Goah ,B.N. Hygine and Public Health ,Calcutta :Scientific Publishing Co.1989.
4. Hanllon, John ,I. Principal of Public Health Administration Saint Louis :The C.V. Mosby Company 1969.
5. Katz, Alfred ,H ,and Felton , Jean Spences Health and the community .London :Coltion Mc Millan Limited 1965.
6. Park ,J.E. and Park ,K. Preventive and Social medicine Jabalpur : M/s.Banarsidas Bhanot Publishers,1983.

BPES SEMESTER – IV

GAMES (PRACTAL)

BADMINTON/HOCKEY AND FOOTBALL/CRICKET

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields

B PES SEMESTER V

Management of Physical Education

Unit I

Introduction

- (a) Meaning and definition of planning ,organizing, administration and management and their nature and scope.
- (b) Importance of planning and management in educational institutions .
- (c) Principles of planning and management , organisation structure :
 - (i). Working out an effective scheme of organaisation.
 - (ii). Scheme of organisation in school ,college and university.
 - (iii).Scheme of organisation in the district and state education.

Unit II.

Facilities and equipments

- (a) Layout of the school building and other facilities.
- (b) Types of buildings,laboratories ,other built-up facilities.
- (c) Layout of physical education facilities common and special .
- (d) Need and importance o equipment for physical education and recreation
- (e) An ideal of equipment or physical education and recreational activities.
- (f) Realistic approach in purchases , procedures.
- (g) Development of improvised equipments
- (h) Storing,store keeping.
 - (i) Care , maintenance, repairs and disposal equipments.

Unit III

Staff and Leadership

- (a) Head of the Institute , his role in imbining the spirit of discipline in sports and education.
- (b) Importance of qualified teachers of physical education and recreational leaders
- (c) Qualities of good teachers /teachers of physical education
- (d) Development of voluntary services of other teachers .
- (e) Student leadership it's importance and limitations
- (f) Staff cooperation
- (g) Selection of training of students leaders
- (h) Recognition of staff and student leaders.

Unit IV

Intramurals and extramural, Public Relations

(A) Intramural

- (a) it's importance and planning.
- (b).Events of Competition, Time and facility factors.
- (c). Point system, award recognition

(B) Extramural

- (a) Outcomes of participation (educational)
- (b) Limitations in participation.
- (c) Selection and training of teams.
- (d) Participation ,finances and other aspects .

(C). Public Relations

- (a). Definition and need.
- (b). Principles of public relations in physical educations.
- (c). Techniques , sue of media
- (d). Relations with parents , public and other bodies.
- (e). Demonstration , displays on special occasions

Unit V

Office management and budget

- (a). Maintainence of records
- (b). Office Correspondence , filing and reports .
- (c). Physical education budget and it's preparation
- (d). Income & expenditure (sources)
- (e). Maintainence of accounts.
- (f). Petty cash.

References:

1. Joseph ,P.M.Organisation of physical education , The old students association ,TIPE Kandivali (bombay).1963.
2. Voltmer ,E.F.et al The organisation and administration of physical education , prentice hall inc., New Jersey , 1979.
3. Bucher ,C.A.Administration of Physical Education and atheletic programmes , The C.V.Mosby Co. London 1983.
4. Zeigler ,E.R. and Bowie G.W Management Competency Development in Sports and Physical Education , Lea and Febiger, Philadelphia ,!983.
5. Maheshwari ,B.L.Managaement by Objective , Tata Mc.Graw -Hill. Publishing Co. Ltd. New Delhi 1982.
6. ALen L.A.Management and Organisation , McGraw -Hill Book Co. Inc. London 1958.
7. Newman W.H. Administrative Action, Prentice Hall Inc. New Jersey ,1963.
8. Huges , W.L.etal Administration and physical Education. The Ronald Press Co. New York,1962.

B PES SEMESTER V

GYM MANAGEMENT AND FITNESS TRAINING

Unit – I : Introduction

- a. Concept of a Gym /Health Club (Basic Facilities)
- b. Equipments for modern gym (Strength Section, Cardio Section, Floor Exercise Section)
- c. Sauna and Steam Therapy
- d. Concept of SPA

Unit –II : Gym Management

- a. Staffing Pattern of a Gym
- b. Budget Preparation
- c. Various Programs
- d. Pre and Post Training Testing
 - a. Cardio-Respiratory Endurance
 - b. Muscular Endurance
 - c. Muscular Strength
 - d. Musculoskeletal Flexibility

Unit – III : Nutrition

- a. Nutrition and Nutritional Supplements
- b. Calculating caloric of intake and output
- c. Preparing a diet chart
- d. Role of various nutritional products

Unit – IV : Strength Training

- a. Exercise for developing
 - i. Chest Muscles
 - ii. Back Muscles
 - iii. Shoulder Muscles
 - iv. Arm Exercise
 - v. Abdominal Muscles
 - vi. Thigh Muscles
 - vii. Calf Muscles

Unit – V : Obesity and Weight Control

- a. Overweight and obesity
- b. Methods of assessing body fat
- c. Principles of fat reduction program
- d. Exercise for controlling fat

References:

1. Arnold, Schwarzenegger; The New Encyclopedia of Modern Body Building. Fireside Rockefeller, 1230 Avenue of the Americas , 2002
2. Thomas, R Baechle; Fitness Weight Training, Human Kinetics, 2001
3. Blau, F.C. Hand Book of Food and Nutrition; Bikaner Agro Botanical Publishers, 4 E – 106 J.N.Vyas Nagar , 1999
4. Gupta, K ; Food and Nutrition. New Delhi: Jaypee Brothers, 1984
5. Foster, E.R and Hartinger, Karyn; Fitness Fun. Champaign: Human Kinetics, 1992
6. Miller, David K. and Allen , T Earl; Fitness A lifetime Commitment. Delhi: Surjeet Publication, 1982
7. Uppal A.K. ; Physical Fitness How to Develop. Delhi : Friends Publications, 1992
8. Williams, Melvin; Lifetime Fitness and Wellness. Boulevard Dubuque : Wm .C. Brown , 2001

B PES SEMESTER V

CRICKET SPECIALIZATION

1. Introduction of the game and historical development with special reference to India.
2. Important tournament held at national and International levels and distinguished personalities related to the game.
3. National and International bodies ,controlling the sports/game and their function
4. Fundamental Skills.
 - a. Batting
 - (i) Forward defensive stroke
 - (ii) Backward defensive stroke.
 - b. Bowling
 - (i) Simple bowling
 - c. Fielding
 - (i) Defensive fielding –Orthodox, Unorthodox.
 - (ii) Offensive Fielding .
 - d. Catching
 - (i) High Catching.
 - (ii) Slip Catching.
 - e. Stopping and throwing techniques.
 - f. Wicket keeping technique.
5. Advanced Skill
 - a. Batting
 - (i) Forward defensive stroke
 - (ii) Backward defensive stroke
 - (iii) Forward off drive
 - (iv) Forward on drive.
 - b. Bowling.
 - (i) Simple bowling techniques.
 - (ii) Difference between pace.
 - (iii) Bowling and spin bowling : Off and leg spin bowling.
 - c. Fielding : Different techniques of fielding and its importance.
 - d. Catching : Different types of catching ,its techniques and importance.
 - e. Stopping and throwing : Different techniques and its importance.
 - f. Wicket Keeping : Different techniques and their implications.
6. Rules and their interpretations and duties of officials.

References:

- Micharda ,Barry ,Barry Richard Cricket.London Pelhon Books, 1979.
- Mankar , Vinno, How to play Cricket. Rupa and Company, 1976.
- Greig ,Tony , Greug in Cricket .Bombay, S. Publication, 1975.
- John Snow ,Cricket Fondon : William Dushmanby Publisher Ltd. 1973.

B PES SEMESTER V

BADMINTON SPECIALIZATION

Unit I - History of Badminton

- (a) In India
- (b) In Asia
- (c) In World

Unit II – Laws of Badminton

- (a) Laws of Badminton with interpretations.
- (b) Recommendations to technical officials and their duties.
- (c) Terminologies in badminton

Unit III – Fixture/Draw in Badminton

- (a) Fixture for inter collegiate Badminton Competitions.
- (b) University – Zonal and All India University Tournaments

Unit IV – Fundamental Skills

- (a) Racket and Shuttle Grips
- (b) Serricsand Rehires
- (c) Forehand and backhand stokes – smash over and clear drops under arms clear drive and net shot.
- (d) Basic footwork

Unit IV - Basic Tactics Strategy

- (a) Singles – Systems of Play
- (b) Doubles – Systems of Play
 - Front and Back
 - Side by Side
 - Rotation

Unit V - warming up

- (b) Specific Exercises of warm up and conditioning.
- (a) General and Specific warm up.
- (c) Fundamental Training drills in Badminton.

References:

Jake Downey, Badminton for Schools.

B PES SEMESTER V

ATHLETICS SPECIALIZATION

Unit – I History

- a. Historical review of various athletic events (up to 2000)
- b. Historical review of various sports awards to athletes (up to 2000)

Unit –II Federation and Tournaments

- a. IAAF Council and committees
- b. International Competitions

Unit – III Training Methods

- a. Warming –up
- b. Training Loads

Unit – IV Skills and Techniques

- a. Crouch Start
- b. Triple Jump
- c. Fosbury Flop technique of High Jump
- d. Hitch kick technique of Long Jump
- e. Scientific basis of above techniques

Unit – V : Officiating Playfields and Equipments

- a. Basic rules of sprints, Long Jump, High Jump, and Triple Jump.
- b. Mechanics of Officiating All track Events, Walking and Road races (Marathon and Half Marathon)
- c. Equipment and specifications of all track related equipments
- d. Layouts and maintenances of all track events.

BPES SEMESTER V

GYMNASTICS SPECIALIZATION

Unit-I History of Gymnastics in world:- Earliest History & Middle age.

A Brief History of Greek, Sweden, Denmark Germany ,France.

Unit - II

A Organization of : F.I.G.

B Value of gymnastics, how gymnastics can be popularise in India.

Unit - III Training Methods

A Warming up (General and specific)

B Training load.

Unit - IV Techniques:

Teaching of Advance skills and techniques (at least three on each apparatus)

A Specification of apparatus used for men and women.

B Lay out and maintenance of gymnasium.

Unit - V

A Purpose and goal of code of points

B Evaluation of the Exercise.

BPES SEMESTER V

HOCKEY SPECIALIZATION

Unit I - Origin of Hockey – Ancient hockey, modern hockey, hockey in India.

Unit II - History of Major International and National Hockey Championships

- a. World Cup Hockey, Olympic Games, Championship trophy and Asia Cup.
- b. Rangaswami Cup, Benghton Cup.

Unit III - Basic and Advance Skills of Hockey -

- (a) Rolling, Pushing, Hitting, Stopping.
- (b) Dribbling, Receiving, Flick, Scoop, Dodging and Tackling.

Unit IV - Meaning of Sports Training. Definition of Sports Training. Aims of Sports Training. Objectives of Sports Training. Characteristics of Sports Training. Principles of Sports Training.

Unit V-

- (a) Drills and Test in Hockey.
- (b) Construction, layout and maintenance of playfields & equipments.

BPES SEMESTER V

FOOTBALL SPECIALIZATION

Unit - I History of football (National and International)

Unit - II Organization of federation and association
(District, State, National and International)

Unit –III Techniques

- a. Advance skill and techniques
- b. General mechanical principals applied to skill techniques

Unit –IV Rules and their interpretations

Unit –V Layout and maintenance of playfields and equipments

BPES SEMESTER V

GAMES (PRACTAL)

TABLE TENNIS AND KABADDI

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields

B PES SEMESTER VI

TEST AND MEASUREMENT IN PHYSICAL EDUCATION

Unit I :Introduction

- (1) Meaning of Test ,Measurement and Evaluation .Need and Impotence of Test and Measurement and Evaluation in Physical Education.
- (2) Meaning of Statistics ,Need and Importance of Statistics.
- (3) Meaning of Data .Kinds of Data.
- (4) Frequency Table – Meaning construction and uses .Population and sample. Sampling techniques – importance and principles.

Unit II: Fundamentals of Statistics

- (1) Measures of Central Tendency –Meaning uses and calculations from frequency tables .
- (2) Measures of variability –meaning uses and calculations.
- (3) Graphical representation of Data.
- (4) Percentile Meaning, uses and calculations.
- (5) Correlations –Meaning ,uses and calculations.

Unit III: Test and Evaluation and Construction

- (1) Knowledge Test . Importance and Types
- (2) Items to be included in objective and subjective knowledge tests
- (3) Criteria of test selection

Unit IV: Measurement of Health Status

- (1) Measurement of nutritional status (subjective and objective.)
- (2) Somatotyping- A brief account of kretchmer`s and Sheldon`s body types.

Unit V: Measurement of Social Efficiency, Physical Fitness and Skill Performance

- (1) Sports Skill Tests:
 - (a) Lockhart and McPherson Badminton Test.
 - (b) Johnson Basketball Ability Test.
 - (c) McDonald Soccer Test.
 - (d) Brady Volleyball Test.
 - (e) Dribble and Goal Shooting Test in Hockey.
- (2) Fitness Tests –Roger`s PFI, AAHPERD Youth Fitness Test, Indiana Motor Fitness Test, JCR Test and Kraus –Weber Test.

Reference:

1. Clarke ,H.H. Application of Measurement to Health and Physical Education, Englewood Cliffs, N .J. : Prentice Hall Inc.
2. Larson ,L. A. and Yacom ,R.D. Measurement and Evaluation in Physical ,Health and Recreation Education .St. Louis :C.V. Mosby Company 1957 .
3. Mathews. Donald K. Measurement in Physical Education ,London : W .B. Saunders Company , 1973.
4. Neilson ,N.P. : An Elementary course in Statistics ,Test and Measurement in Physical Education , National Tests Polo Alth, 1960.

BPES SEMESTER VI

CORRECTIVES AND REHABILITATION IN PHYSICAL EDUCATION

Unit I:

- (a) Meaning and scope of “Correctives” in Physical Education.
- (b) Posture and its deviation :
 - (1) Definition. Standards of standing posture values of good posture, causes and drawbacks of bad posture.
 - (2) Common postural deviations, their causes and remedial exercises :
 - (a) Kyphosis (b) Scoliosis (c) Lordosis
 - (d) Knock Knees (e) Bowlegs (f) Flat – feet.
 - (3) Organization of a corrective-Gymnastic Class (Group theory) and its advantages.

Unit II:

- (a) (1) Scope of Sports injuries in Physical Education.
(2) Hazards of Incomplete treatment.
- (b) Prevention of injuries:
 - (1) Factors predisposing the sports injuries.
 - (2) General principles regarding the prevention of injuries.
- (c) Common sports injuries and their immediate treatment:
 - (1) Contusion (2) Abrasion (3) Laceration
 - (4) Sprain (5) Strain (6) Haematoma
 - (7) Fracture (8) Dislocation.

Unit III: Rehabilitation

- (1) Definition aims and objectives and scope and rehabilitation.
- (2) Goals of rehabilitation.
- (3) An introduction of effects and uses of Therapeutic Modalities in rehabilitation.
 - (a) Cold Therapy (b) Infra Red Radiation
 - (c) Contrast Bath (d) Wax Bath Therapy
 - (e) Hydrotherapy (Exercises under water).

Unit IV:

- (A) Therapeutic Exercises
 - (1) Definition and scope of Therapeutic Exercises in Athletic injuries.
 - (2) Classification, Physiological effects and uses of the following:
 - (a) Active Exercise (Free, Assisted and Resisted, Movements).
 - (b) Passive Exercises (Relaxed and forced movements).
 - (3) An introduction to progressive resistance exercises method.
- (B) Techniques of Therapeutic Exercises:
 - (a) Muscles Strengthening Exercises.
 - (b) General Principles of Muscle Strengthening.
 - (c) Manual-Muscle testing: A Method of assessing Muscle-strength.
 - 1. Stretching and Mobilizing Exercises : Factors causing Limitation of joint Range, General mobilizing methods, and practical demonstration of exercises to mobilizing the shoulder, elbow, wrist, hip knee, ankle and foot.
 - 2. Testing of common soft tissue tightness or contractures and suitable exercises to stretch them.

Unit V: Therapeutic and Sports Massage

- (1) Definition and brief history of massage and remedial exercises.
- (2) General approach to a Massage Manipulation.
- (3) Common Physiological effects of Massage.
- (4) Common Massage Manipulations used in sports and Athletics and their therapeutic uses.
- (5) Contra – indications of massages in general.
- (6) Techniques of Massage for the limbs, back and neck.

Books Recommended:

1. First Aids to the Injured, New Delhi , St. John Ambulance Association.
2. Johnson, W.R. and Buskirk, E.R. “Science and Medicine of Exercise and Sports” , New York, Harper and Row , 1974.
3. O’Dongho D. “Treatment of Injuries to Athletes”, Philadelphia : W.B. Saunders and Company
4. Pande, P.K. Gupta, L.C. : ‘ outline of sports Medicine’, New Delhi Jaypee Brothe, 1987.
5. Reilly Thomas : ‘Sport Fitness and sports Injured’, London, Faber and Faber Ltd. , 1981.
6. Strauss, R.H. : ‘ Sports Medicine’, Philadelphia, W.B. Saunders Co. , 1984 .
7. Steven Roy, Irvin Richard, ‘ Sports Medicine, Engle wood cliffn N.J. : Prentice Hall, 1983.
8. Colson John, Proressive Exercise Therapy, Bristol John Wright and sons Ltd. 1969.
9. Danies and worthingham . Muscle Testing : Techniques of Manual Examination, Philadelphia, W.B. Saunders Co.
10. Forster, Palastangas : ‘Clayton’s Electrotherapy’ Delhi CBS Publishers and Distributors.
11. Gardiner M. Dena : ‘The Principles of Exercise Theraph’ : London : Bell and Hyman, 1981.
12. Kessler Henry H. : The Principles and Practices of Rehabilitatin, Philadelphia, lea and Febiger, 1950.
13. Rathbone J.L. , ‘Corrective Physical Education’ , London, W.B. Saunders Co.
14. Wood and Backer, Board, Massage : Philadelphia : W.B. Saunders Co.
15. Yliery J. and Cash, M. Sports Massage : London : stanty Paul and co. 1988.

BPES SEMESTER VI
CRICKET SPECIALIZATION

Unit - I

Rules and then interpretations.

Unit - II

- (A) Standard one day and Twenty- Twenty and Test Match Playing Conditions.
- (B) All advance skills.

Unit - III

Officiating – Duties of Umpires, Referees and Scorers -

- (A) Before the Match.
- (B) During the Match.
- (C) During the intervals.
- (D) Joint Desiccation.
- (E) After the Match.

Unit - IV

Lay out, construction and maintenance of cricket field and markings.

Unit - V

Awards and Personalities

- (A) Sunil Gawaskar
- (B) M.S. Dhoni
- (C) Sandhya Agarwal
- (D) Ajit Wadekar
- (E) B. Bedi

References:

1. Frank Tyson, Manual for cricket coaching.
2. Tom Smith umpiring and scoring
3. E.B. Elbloria Cricket Coaching.

BPES SEMESTER VI

BADMINTON SPECIALIZATION

Unit I- Awards and Personalities

(a) Awards- Rajiv Gandhi Khal Ratna, Padma Shri, Arjuna Award, Dronacharya Award.

(b) Prakash Padukone, Gopichand, Dinesh Khanna, Nanda Natekar Syed Modi, Ani Ghia, Meena Shah, Mohmmad Arif.

Unit II- Management

(a) Construction of Badminton Hall.

(b) Court marking and its maintenance

(c) Flooring, height, lighting system, space around courts surroundings and umpire's chair.

Unit III- Officiating in Badminton

(a) Fixtures for District/State/National/International Open Tournaments.

(b) Instructions for filling up the score sheet for singles, doubles and mixed doubles.

Unit IV- Advanced skills

(a) Round the Head strokes- clear, smarth and drop.

(b) Jump Smarsh, Half and sliced Net dribble.

(c) Advanced Footwork.

Unit V- Tactics and Strategy

(a) Mixed Doubles

(b) Lead up Games, Recreation Games in Badminton.

References:-

1. Jake Downey, Better Badminton for All.

BPES SEMESTER VI

ATHLETICS SPECIALIZATION

Unit – I : History

- a. Historical review of various athletic events (after 2000)
 - a. Historical review of various sports awards to athletes (after 2000)

Unit –II : Federation and Tournaments

- a. Anti – Doping Rules
- b. Prohibited Agents
- c. Procedure of Testing

Unit – III: Training Methods

- a. Training of Speed
- b. Training of Endurance
- c. Training of Strength

Unit – IV: Skills and Techniques

- a. Techniques of shotput
- b. Technique of Discus throw
- c. Technique of Javelin Throw
- d. Techniques of Baton exchange
- e. Theoretical concept of Techniques of Hammer Throw and of Pole Vault
 - b. Scientific basis of above techniques

Unit – V : Officiating Playfields and Equipments

- a. Basic rules of Relay Race, Shotput, Discus throw, Javelin Throw, Hammer throw and Pole Vault.
- b. Mechanics of Officiating All throws, Pole Vault and Relay Races.
- c. Equipment and specifications of all throws, pole vault and relay races related equipments.
- d. Layouts and maintenances of all Field events.

BPES SEMESTER VI

GYMNASTICS SPECIALIZATION

Unit - I

- A History of gymnastics in India.
- B Brief History of France, U.S.S.R., England, U. S.A.

Unit - II

- A Organization of : G.F.I.
- B Safety and spotting techniques.

Unit - III Training Methods

- A Training of strength.
- B Training of speed.
- C Training of Endurance.
- D Training of Feasibility.
- E Training of Co-ordinative abilities.

Unit - IV General mechanical principles applied to skills/techniques.

Unit -V

- A Competition I, II & III.
- B Table of general faults & penalties.
- C Regulations for judge's structure, composition and function of juries.

BPES SEMESTER VI

HOCKEY SPECIALIZATION

Unit I- Organizations

- (a) F.I.H. structure and functions.
- (b) H.I.F. structure and functions.

Unit II

- (a) Fitness and Coaching in Hockey.
- (b) Skill acquisition.
- (c) System of Play.

Unit III- Mechanical and muscular analysis of skills

Unit IV- Mechanics of officiating.

Unit V- Rules and their interpretation.

BPES SEMESTER VI

FOOTBALL SPECIALIZATION

Unit - I Organization

- a. FIFA structure and function
- b. AIFF structure and functions

Unit – II Training Method

- a. Warming up (General and Specific)
- b. Training load
- c. Training as motor qualities (General)

Unit – III Tactics

- a. Advance skill and tactics

Unit- IV Basic and advance skill of football

- a. Various types of receiving
- b. Various types of kicking
- c. Throwing in
- d. Dribbling

Unit-V

- a. Fitness and coaching in football
- b. System of play

BPES SEMESTER VI

GAMES (PRACTAL)

KHO-KHO AND TENNIS

Common syllabus all games

Unit- I. History of game, Federations and Competitions.

Unit- II. Rules and their interpretation.

Unit- III. Fundamental and Advance skills.

Unit- IV. Equipments and their specification and maintenance.

Unit- V. Layout and maintenance of playfields